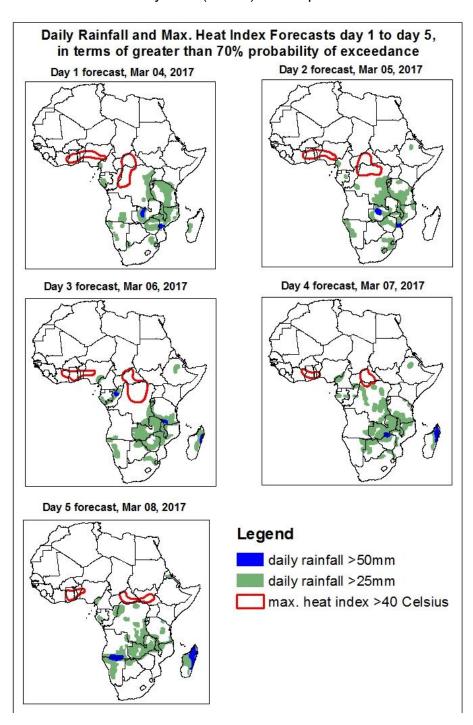
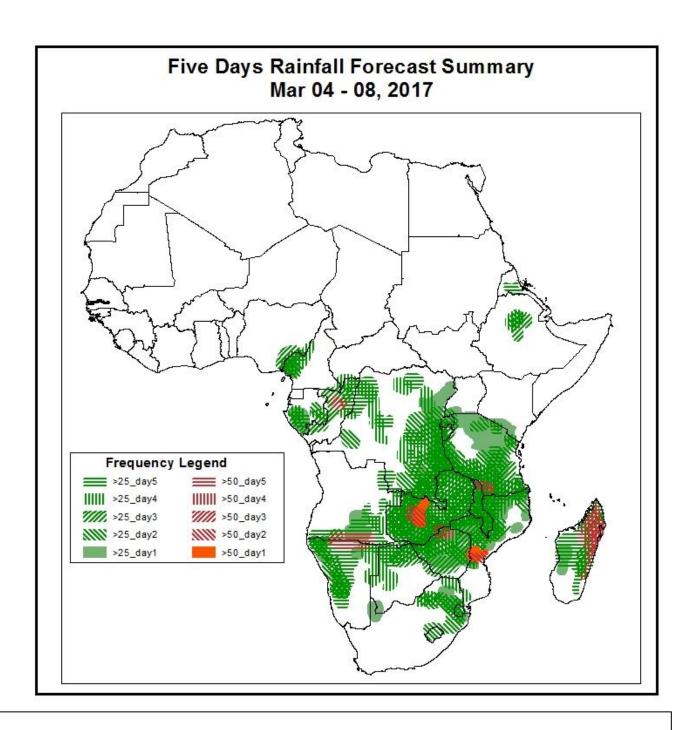
## 1. Rainfall, Heat Index and Dust Concentration Forecasts, (Issued on Mar 03, 2017)

## **1.1. Daily Rainfall and Maximum Heat Index Forecasts** (valid: Mar 04 – 08, 2017)

The forecasts are expressed in terms of high probability of precipitation (POP) and high probability of maximum heat index, based on the NCEP/GFS, ECMWF and the NCEP Global Ensemble Forecasts System (GEFS) and expert assessment.



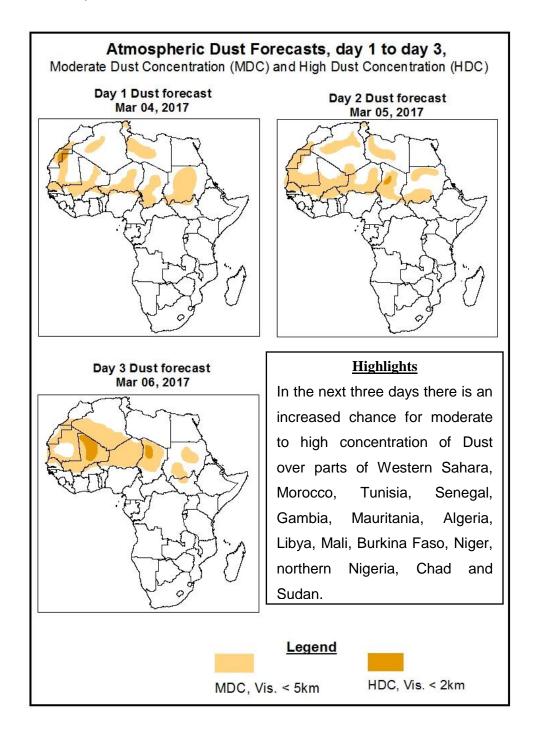


# <u>Highlights</u>

In the next five days, lower level wind convergences across the Central and South African countries are expected to enhance rainfall in their respective regions. Therefore, there is an increased chance for two or more days of moderate to heavy rainfall over portions of Gabon, Congo, DRC, Rwanda, Burundi, Tanzania, Zambia, Malawi, Mozambique, Namibia and Zimbabwe and Madagascar local areas of Cameroon, Ethiopia, Uganda, Angola, Botswana, South Africa and Swaziland.

## **1.2. Atmospheric Dust Concentration Forecasts** (valid: Mar 04 – 06, 2017)

The forecasts are expressed in terms of high probability of dust concentration, based on the Navy Aerosol Analysis and Prediction System, NCEP/GFS lower-level wind forecasts and expert assessment.



#### **1.3. Model Discussion,** Valid: Mar 04 – 08, 2017

The Azores High Pressure system over the North Atlantic Ocean is expected to weaken with its value of the central pressure decreasing from 1028hPa to 1025hPa in the next 48 hours, and intensify with its value of the central pressure increasing to 1030hPa during the remaining forecast period.

The St. Helena High Pressure system over the Southeast of the Atlantic Ocean is expected to weaken with its value of the central pressure decreasing from 1019hPa to 1016hPa in the next 48 hours, and intensify with its value of the central pressure increasing to 1021hPa in the next 72 hours and weaken with its value of the central pressure decreasing from 1020hPa in the next 96 hours and intensify with its values of the central pressure increasing to 1024hPa during the remaining forecast period.

The Mascarene High Pressure system over the Southwest Indian Ocean is expected to intensify with its value of the central pressure increasing from 1023hPa to 1030hPa in the next 72 hours and weaken with its value of the central pressure decreasing to 1029hPa during the remaining forecast period.

At 925hPa, strong dry Northeasterly to Easterly winds may lead from light to moderate dust concentration over parts of Western Sahara, Morocco, Tunisia, Senegal, Gambia, Mauritania, Algeria, Libya, Egypt, Mali, Burkina Faso, Niger, northern Nigeria, Chad and Sudan.

At 850hPa level, lower level wind convergences are expected to prevail over Cameroon, CAR, DRC, South Sudan, Uganda, Angola, Zambia, Tanzania, Namibia, Botswana, Mozambique, South Africa and Madagascar.

In the next five days, lower level wind convergences across the Central and South African countries are expected to enhance rainfall in their respective regions. Therefore, there is an increased chance for two or more days of moderate to heavy rainfall over portions of Gabon, Congo, DRC, Rwanda, Burundi, Tanzania, Zambia, Malawi, Mozambique, Namibia and Zimbabwe and Madagascar local areas of Cameroon, Ethiopia, Uganda, Angola, Botswana, South Africa and Swaziland.

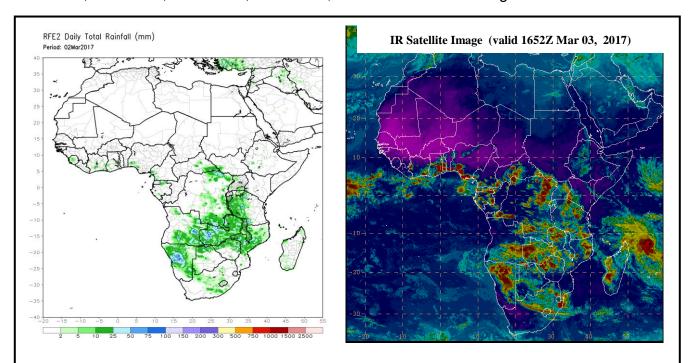
## 2.0. Previous and Current Day Weather over Africa

#### 2.1. Weather assessment for the previous day (Mar 02, 2017)

Light to moderate rainfall was observed over portions of Cote d'Ivoire, Nigeria, Gabon, South Sudan, Ethiopia, DRC, Uganda, Kenya, Tanzania, Angola, Zambia, Malawi, Mozambique, Namibia, Botswana, Zimbabwe and South Africa.

## 2.2. Weather assessment for the current day (Mar 03, 2017)

Intense convective clouds are observed over portions of Guinea, Liberia, Cote d'Ivoire, Togo, Benin, Nigeria, Cameroon, Equatorial Guinea, Gabon, Congo, CAR, DRC, South Sudan, Ethiopia, Uganda, Kenya, Burundi, Tanzania, Angola, Zambia, Malawi, Mozambique, Namibia, Botswana, Zimbabwe, Swaziland, South Africa and Madagascar.



Previous day rainfall condition over Africa (Left) based on the NCEP CPCE/RFE and current day cloud cover (right) based on IR Satellite image.

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